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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/714,021	11/13/2003	Atsushi Kato	075834.00447	1983

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EXAMINER
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BERNATZ, KEVIN M

ART UNIT	PAPER NUMBER
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1773

DATE MAILED: 06/13/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/714,021

Applicant(s)

KATO ET AL

Examiner

Kevin M. Bernatz

Art Unit

1773

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-8 is/are pending in the application.
- 4a) Of the above claim(s) 5-7 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4 and 8 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date ____. | 6) <input type="checkbox"/> Other: ____.  |

## **DETAILED ACTION**

### ***Response to Amendment***

1. Amendments to claims 1 and 2, and addition of new claim 8, filed on April 3, 2006, have been entered in the above-identified application.
2. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

### ***Specification***

3. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

The following title is suggested: "Magnetic Recording Medium With Dual Magnetic Layers Including Specific Resins".

### ***Claim Rejections - 35 USC § 102***

4. Claims 1 – 4 and 8 are rejected under 35 U.S.C. 102(b) as being anticipated by Hashimoto et al. (U.S. Patent No. 6,045,901) for the reasons of record as set forth in Paragraph No. 3 of the Office Action mailed on September 30, 2005.

Regarding the amended language of claim 1, the Examiner notes that Hashimoto et al. teach that both magnetic layers are formed above the non-magnetic supporter and are formed from a magnetic paint in a binder (*col. 3, lines 28 – 37 and examples*)

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wherein a concentration of a urethane group in the binder resins ranges from 0.5 mmol/g to 3.0 mmol/g (*col. 5, lines 10 – 14*).

Regarding the amended language of claim 2, the Examiner notes that the amendment merely places the claim into better grammatical form, but the scope of the claim has not substantially changed (hence, the claim is still met for the reasons of record noted above).

Regarding new claim 8, Hashimoto et al. disclose parts by weight of the urethane binder meeting applicants' claimed limitations (*col. 5, lines 18 – 21 and examples*).

### ***Claim Rejections - 35 USC § 103***

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 1 – 4 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Murayama et al. (U.S. Patent No. 6,010,773) in view of Hashimoto et al. ('901).

Murayama et al. is relied upon as set forth in Paragraph No. 4 of the Office Action mailed on September 30, 2005.

Regarding the amended language of claim 1, the Examiner notes that Murayama et al. teach that both magnetic layers are formed above the non-magnetic supporter and are formed from a magnetic paint in a binder (*col. 9, lines 7 – 42 and examples*).

Murayama et al. fail to disclose wherein a concentration of a urethane group in the binder resins ranges from 0.5 mmol/g to 3.0 mmol/g.

However, Hashimoto et al. teach controlling the urethane concentration in a urethane binder for magnetic recording media to amounts meeting applicants' claimed range in order to insure adequate mechanical strength and dispersion ability (*col. 5, lines 10 – 14*).

It would therefore have been obvious to one of ordinary skill in the art at the time of the applicant(s) invention to modify the device of Murayama et al. to use a urethane concentration meeting applicants' claimed limitations as taught by Hashimoto et al. in order to insure adequate mechanical strength and dispersion ability.

Regarding the amended language of claim 2, the Examiner notes that the amendment merely places the claim into better grammatical form, but the scope of the claim has not substantially changed (hence, the claim is still met for the reasons of record noted above).

Regarding new claim 8, both Murayama et al. and Hashimoto et al. disclose parts by weight of the urethane binder meeting applicants' claimed limitations (*Murayama et al., col. 8, lines 29 – 32 and examples; and Hashimoto et al., col. 5, lines 18 – 21 and examples*).

***Response to Arguments***

**7. The rejection of claims 1 – 4 and 8 under 35 U.S.C § 102(b) – Hashimoto et al.**

**8. The rejection of claims 1 – 4 and 8 under 35 U.S.C § 103(a) –Murayama et al. in view of Hashimoto et al.**

Applicant(s) arguments have been considered but are moot in view of the new ground(s) of rejection. In so far as they apply to the present rejection of record, applicant(s) argue that there is an unexpected improvement when the urethane concentration is controlled to be within the claimed range, noting that “when the urethane group is excessively included in the polyurethane resin, the viscosity of the paint is undesirably raised and/or the dispersion characteristics are deteriorated resulting in degradation of the application surface” (*pages 5 – 6 of response*). The Examiner respectfully disagrees.

First, the Examiner notes that a showing of unexpected results cannot be used to overcome an anticipatory reference. Second, the Examiner notes that the results would not appear to be *unexpected* to one of ordinary skill in the art, given Hashimoto et al.’s explicit teaching that the urethane group concentration directly effects the dispersion characteristics of the film, as argued by applicants’ as being unexpected above.

**Conclusion**

9. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

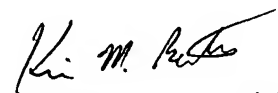
A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kevin M. Bernatz whose telephone number is (571) 272-1505. The examiner can normally be reached on M-F, 9:00 AM - 6:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Carol Chaney can be reached on (571) 272-1284. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

KMB  
June 9, 2006

  
Kevin M. Bernatz, PhD  
Primary Examiner